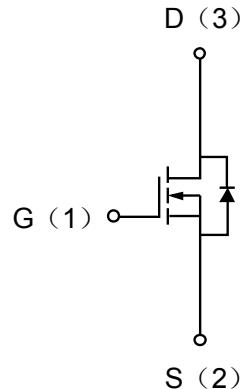


Description

PNMT60V02 is designed for high speed switching applications

The enhancement mode MOS is extremely high density cell and low on-resistance.



MOSFET Product Summary			
$V_{DS}(V)$	$R_{DS(on)}(\Omega)$	$V_{GS(th)}(V)$	$I_D(A)$
60	7.5@ $V_{GS}=10V$	0.5 to 1.5	0.18

Electrical characteristics per line@25°C(unless otherwise specified)

Parameter	Symbol	Conditions	Min.	Typ.	Max.	Units
OFF CHARACTERISTICS						
Drain-Source Breakdown Voltage	V_{DSS}	$I_D=10\mu A, V_{GS}=0V$	60	-	-	V
Zero Gate Voltage Drain Current	I_{DSS}	$V_{DS}=40V, V_{GS}=0V$	-	-	0.5	μA
Gate-Body Leakage Current	I_{GSS}	$V_{DS}=0V, V_{GS}=\pm 20V$	-	-	± 1	μA
Gate Threshold Voltage	$V_{GS(th)}$	$V_{DS}=V_{GS}, I_D=250\mu A$	0.5	-	1.5	V
Static Drain-Source On-Resistance	$R_{DS(on)}$	$V_{GS}=5V, I_D=0.05A$	-	-	7.5	Ω
		$V_{GS}=10V, I_D=0.5A$	-	-	7.5	Ω
DYNAMIC PARAMETERS						
Input Capacitance	C_{ISS}	$V_{GS}=0V, V_{DS}=25V,$ $f=1MHz$	-	-	40	pF
Output Capacitance	C_{DSS}		-	-	20	pF
Reverse Transfer Capacitance	C_{RSS}		-	-	5	pF
SWITCHING PARAMETERS						
Turn-On Delay Time	$t_{d(on)}$	$V_{DS}=30V, V_{GS}=10V,$ $R_G=25\Omega, R_L=150\Omega$ $I_D=0.2A$	-	-	20	ns
Turn-Off Delay Time	$t_{d(off)}$		-	-	20	ns

Absolute maximum rating@25°C

Rating		Symbol	Value	Units
Drain-Source Voltage		V_{DS}	60	V
Gate-Source Voltage		V_{GS}	± 20	V
Drain Current	Continuous	I_D	0.18	A
	Pulsed	I_D	0.36	A
Total Power Dissipation	$T_A=25^\circ\text{C}$	P_D	150	mW

Typical Characteristics

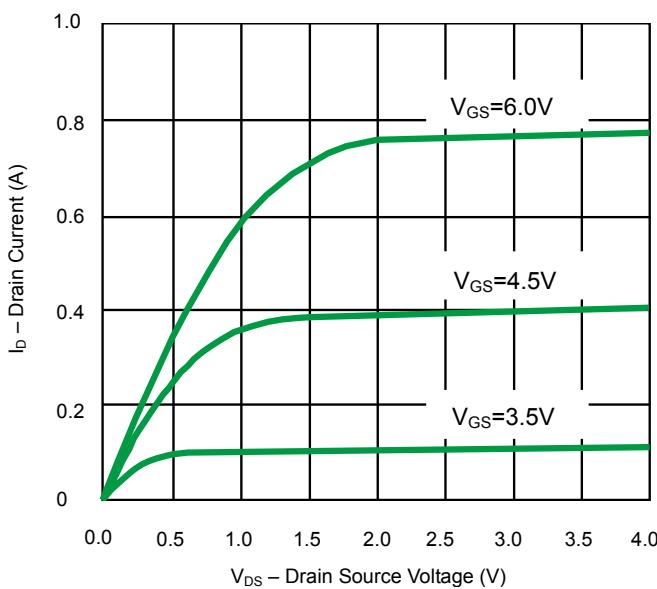


Fig 1. Output Characteristics

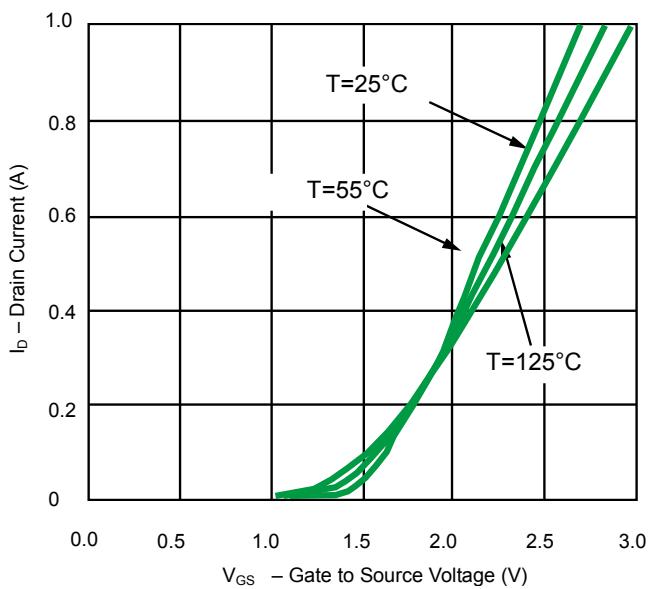


Fig 2. Transfer Characteristics

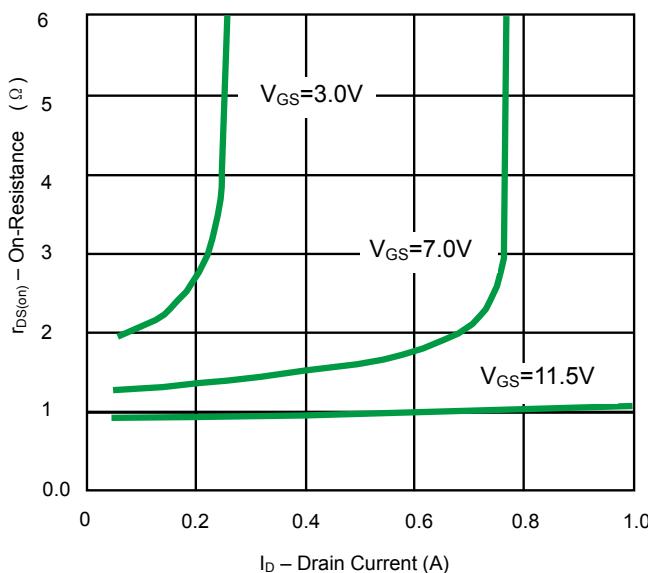


Fig 3. On-Resistance vs. Drain Current

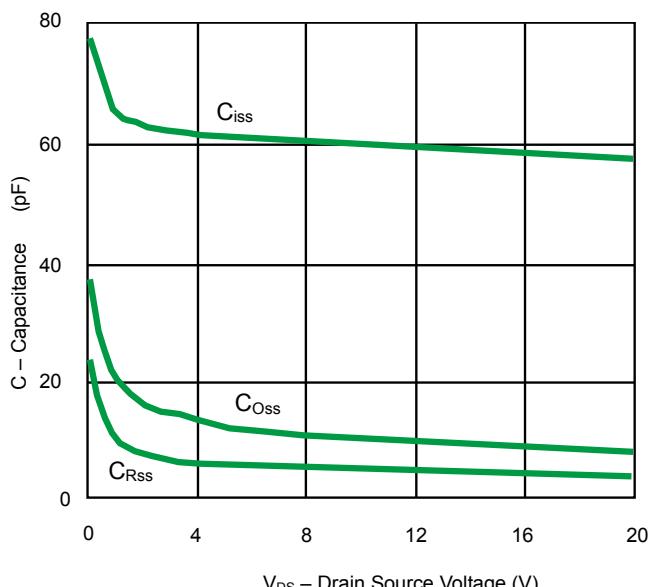
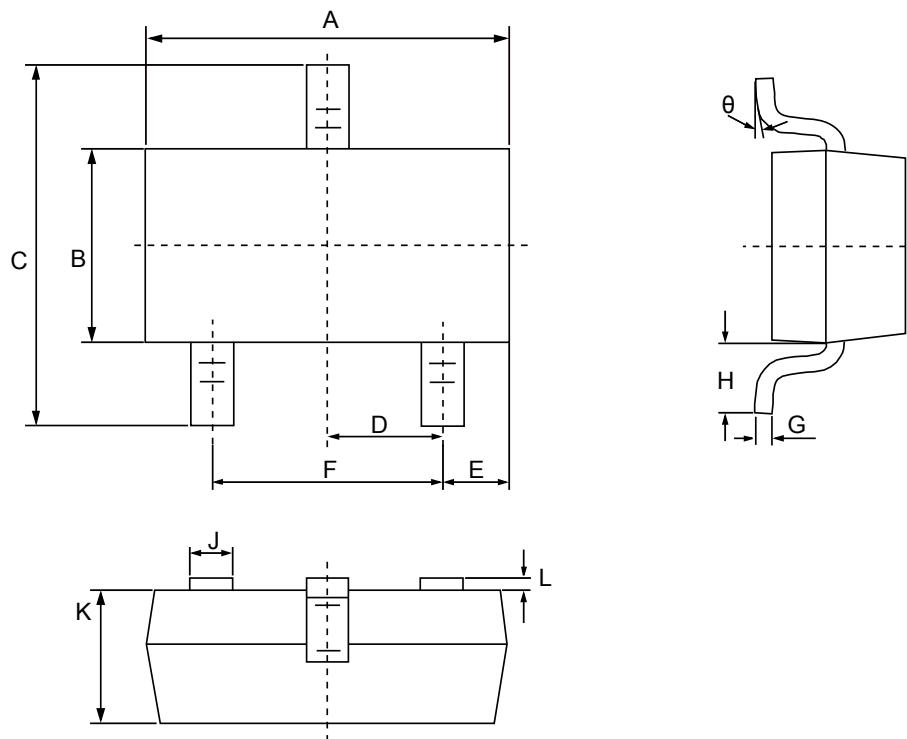


Fig 4. Capacitance

Product dimension(SOT-23)



Dim	Millimeters		Inches	
	MIN	MAX	MIN	MAX
A	2.80	3.00	0.1102	0.1197
B	1.20	1.40	0.0472	0.0551
C	2.10	2.50	0.0830	0.0984
D	0.89	1.02	0.0350	0.0401
E	0.45	0.60	0.0177	0.0236
F	1.78	2.04	0.0701	0.0807
G	0.085	0.177	0.0034	0.0070
H	0.45	0.60	0.0180	0.0236
J	0.37	0.50	0.0150	0.0200
K	0.89	1.11	0.0350	0.0440
L	0.013	0.100	0.0005	0.0040
θ	0°	10°	0°	10°

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